

# OPERATION MANUAL

**MODEL NO: DJR1-UP**

2 P.C. BOARDS TYPE



**Nintendo™**

WARNING  
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This equipment generates, uses and can radiate radio frequency energy and if not installed and used in accordance with the instructions manual, may cause interference to radio communications. As temporarily permitted by regulation it has not been tested for compliance with the limits for Class A computing devices pursuant to Subpart J of Part 15 of FCC Rules, which are designed to provide reasonable protection against such interference. Operation of this equipment in a residential area is likely to cause interference in which case the user at his own expense will be required to take whatever measures may be required to correct the interference.

# C O N T E N T S

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|  |       |    |
|--|-------|----|
| 1. CAUTIONS                            | ..... | 1  |
| 2. SPECIFICATIONS                      | ..... | 2  |
| 3. INSTALLATION OF THE MACHINE         |       |    |
| (1) Cautions on installation           | ..... | 3  |
| (2) Earthing of machine                | ..... | 3  |
| 4. MAINTENANCE AND INSPECTION          |       |    |
| (1) Dismounting of front screen        | ..... | 4  |
| (2) Dismounting of operation panel     | ..... | 4  |
| 5. POINTS AND METHODS OF ADJUSTMENT    |       |    |
| (1) CPU P.C.Board                      | ..... | 5  |
| (2) Adjustment of Semi-Fixed Resistors | ..... | 6  |
| (3) Video Monitor                      | ..... | 7  |
| 6. WIRING AND CONNECTION               | ..... | 8  |
| 7. NAME OF EACH PART                   |       |    |
| (1) Body                               | ..... | 9  |
| (2) Operation Panel Assembly           | ..... | 11 |
| 8. PARTS LIST                          | ..... | 12 |

# C A U T I O N S

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1. P.C.Board should not be exposed direct to the sun. Direct sunshine is very harmful to LSI(memory element).
2. P.C.Board to be stored or transported should be wrapped by a conductive pouch or aluminum foil, because LSI and IC used in the machine are semiconductor integrated circuits of which basic element is MOS-FET.
3. When images on the Video Monitor screen are disturbed by powerful noise or other electrical causes, turn the main power off once and then on again.

## 2. SPECIFICATIONS

|                   |   |                                     |
|-------------------|---|-------------------------------------|
| Power Consumption | : | 118W                                |
| Size              | : | 600(W) × 850(D) × 1700(H)mm.        |
| Weight            | : | 100 Kgs.                            |
| Number of Player  | : | 1 or 2 person(s)                    |
| Number of Junior  | : | 3 ~ 6 (Adjustable)                  |
| Accessories       | : | Operation Manual : 1 copy           |
|                   |   | Key for Back Door : 2 pcs.          |
|                   |   | Key for Coin Box Door : 2 pcs.      |
|                   |   | Fuse : 4 pcs.                       |
|                   |   | 100~120V : 5A × 1, 4A × 2, 0.3A × 1 |
|                   |   | 220~240V : 4A × 2, 3A × 1, 0.3A × 1 |

NOTE: Specifications are subject to change for improvement without notice.

### 3. INSTALLATION OF THE MACHINE

#### 3-1 Cautions on installation

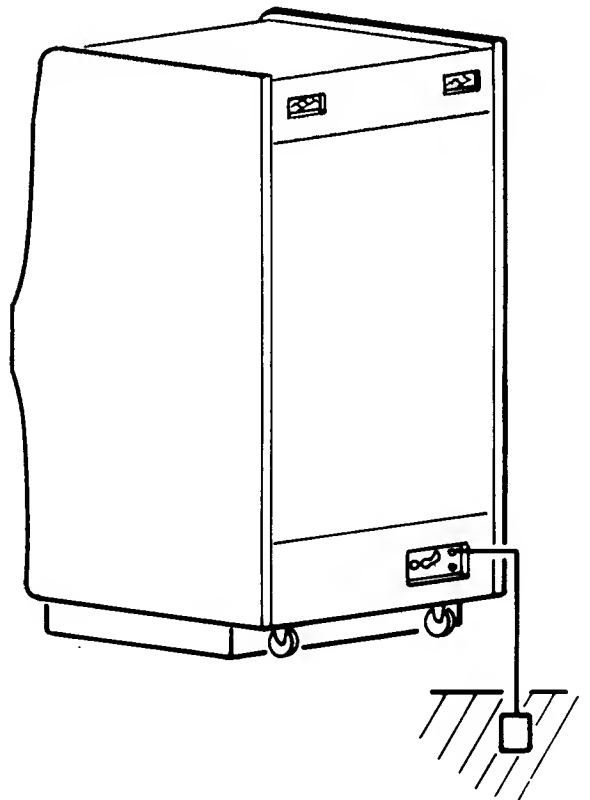
- (1) The power cord of the machine should not be connected to a wall outlet together with large load unit(s) such as motor, cooler, etc.
- (2) Turn the power off before setting and removing the P.C. Board and connectors. Carefully handle them.
- (3) Do not touch IC, LSI and other electronic parts on P.C. Board. Do not use a tester or the like on them. (They may be damaged by the inner voltage of the instruments.)
- (4) When exchanging a fuse, use a new one of the prescribed capacity.
- (5) The machine should be installed where it is not hot, keeping away from a heating appliance and direct sunshine.
- (6) The machine should be installed where it is not wet and dusty.
- (7) Do not touch the inside of the video monitor which has high tension units. Inform service station, if necessary.

#### 3-2 Earthing of machine

- (1) When the machine is installed in a wet place, it should be grounded to avoid accident by an electric shock.
  - a) Connect an earthing wire to the earthing terminal of the machine.
  - b) The opposite end of the earthing wire should be connected to an earthing bar which is firmly inserted into the ground.

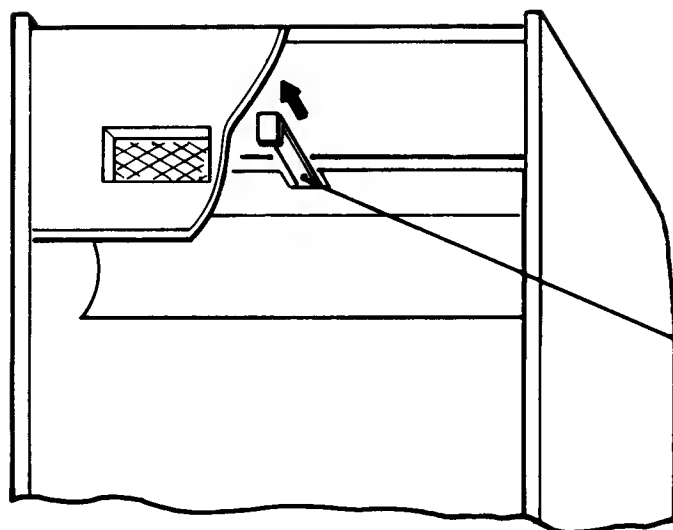
#### (2) Cautions

- a) Do not connect the earthing wire to a water pipe, because polyvinyl-chloride pipes are sometimes used in the water lines and, if so, the electronic continuity is cut at the points.
- b) Do not connect the earthing wire to the gas pipe absolutely. That is very dangerous.



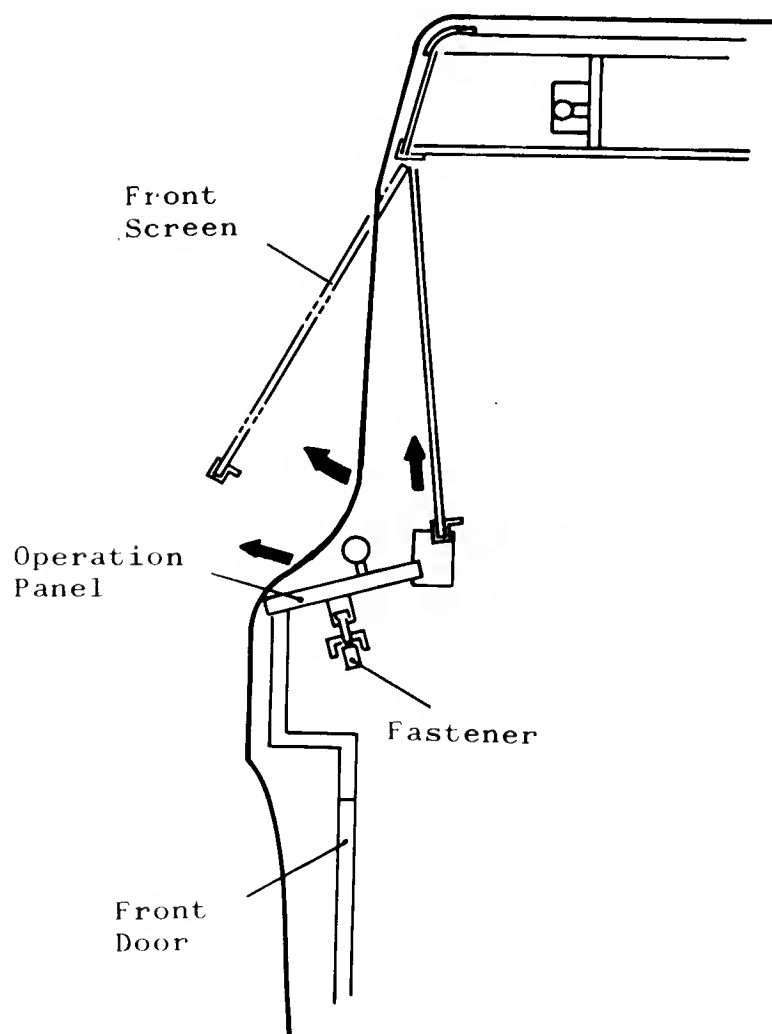
#### 4. MAINTENANCE AND INSPECTION

##### 4-1 Dismounting of front screen



Opening the back door, pull the front screen clamp which is mounted under the top plate. Pull the front screen upward while pushing and then pull toward you.

Front Screen Clamp



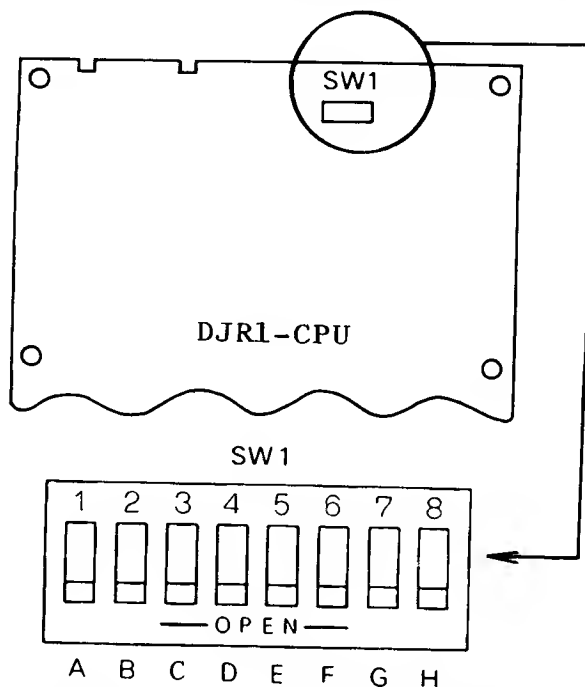
##### 4-2 Dismounting of operation panel

To dismount the operation panel for maintenance or inspection of the Control Unit or Micro Switch, open the front door and unfasten the fastener.

## 5. POINTS AND METHODS OF ADJUSTMENT

### 5-1 CPU P.C.Board

The number of Junior, score level, the number of coin and type of machine can be set with the switches on CPU P.C.Board according to the diagram below.



|                              | A   | B   | C   | D   | E   | F   | G   | H   |
|------------------------------|-----|-----|-----|-----|-----|-----|-----|-----|
| Number of Junior             |     |     |     |     |     |     |     |     |
| 3                            | OFF | OFF |     |     |     |     |     |     |
| 4                            | ON  | OFF |     |     |     |     |     |     |
| 5                            | OFF | ON  |     |     |     |     |     |     |
| 6                            | ON  | ON  |     |     |     |     |     |     |
| Score Level for extra Junior |     |     |     |     |     |     |     |     |
| 10,000 points                |     |     | OFF | OFF |     |     |     |     |
| 15,000 points                |     |     | ON  | OFF |     |     |     |     |
| 20,000 points                |     |     | OFF | ON  |     |     |     |     |
| 25,000 points                |     |     | ON  | ON  |     |     |     |     |
| Coinage                      |     |     |     |     |     |     |     |     |
| 1 coin /1 play               |     |     |     |     | OFF | OFF | OFF |     |
| 1 coin /2 plays              |     |     |     |     | OFF | ON  | OFF |     |
| 1 coin /3 plays              |     |     |     |     | OFF | OFF | ON  |     |
| 1 coin /4 plays              |     |     |     |     | OFF | ON  | ON  |     |
| 2 coins/1 play               |     |     |     |     | ON  | OFF | OFF |     |
| 3 coins/1 play               |     |     |     |     | ON  | ON  | OFF |     |
| 4 coins/1 play               |     |     |     |     | ON  | OFF | ON  |     |
| 5 coins/1 play               |     |     |     |     | ON  | ON  | ON  |     |
| Table/Upright                |     |     |     |     |     |     |     |     |
| Table                        |     |     |     |     |     |     |     | OFF |
| Upright                      |     |     |     |     |     |     |     | ON  |

NOTE : Keep the switch H always at the ON position.



## 5-2 Adjustment of Semi-Fixed Resistors

### VIDEO P.C. Board

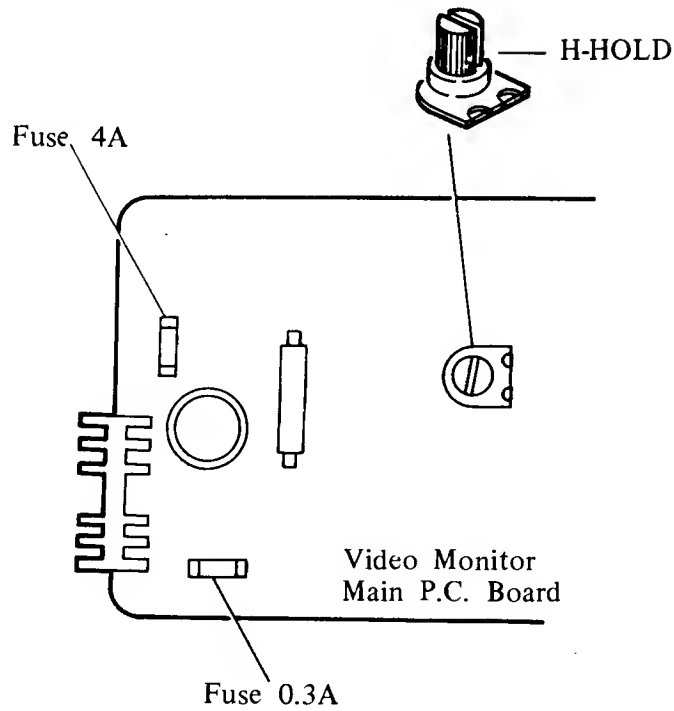
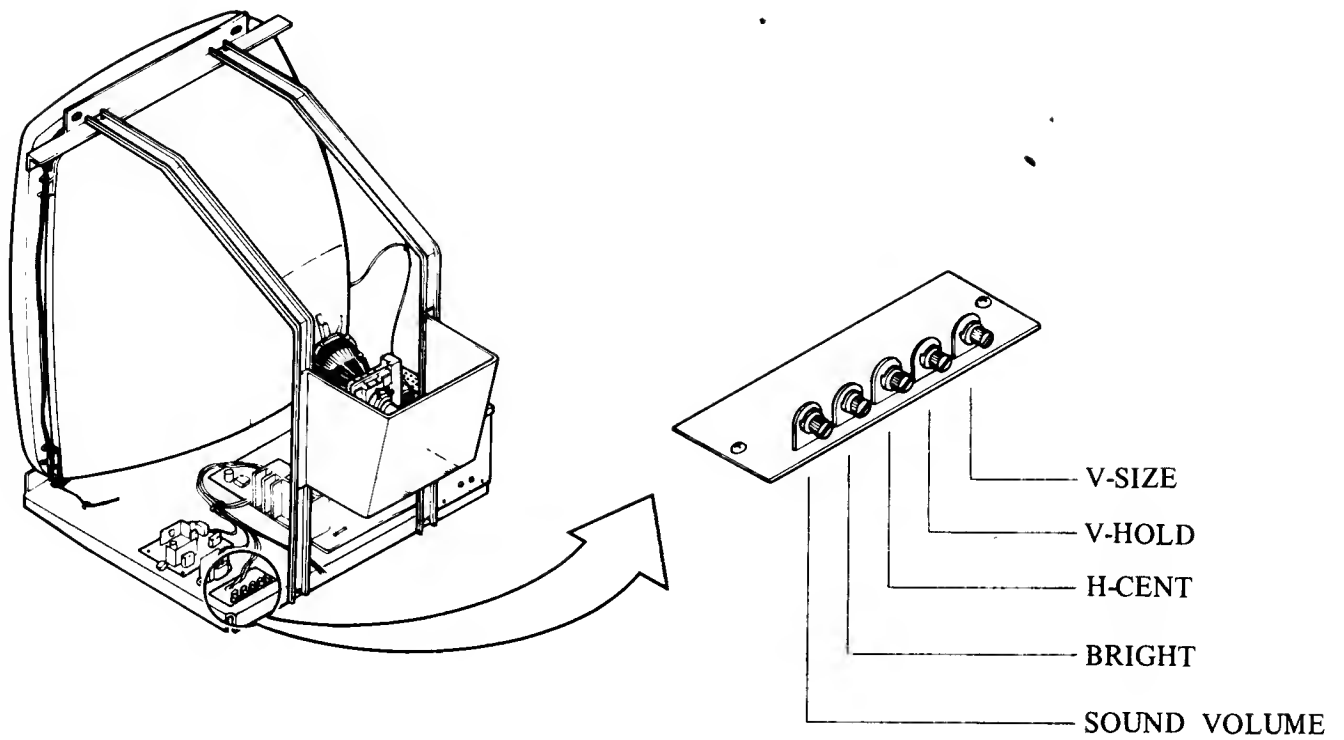
Semi-fixed resistors, VR1 and VR2 on VIDEO P.C. Board are used to adjust video monitor screen.



VIDEO P.C. Board

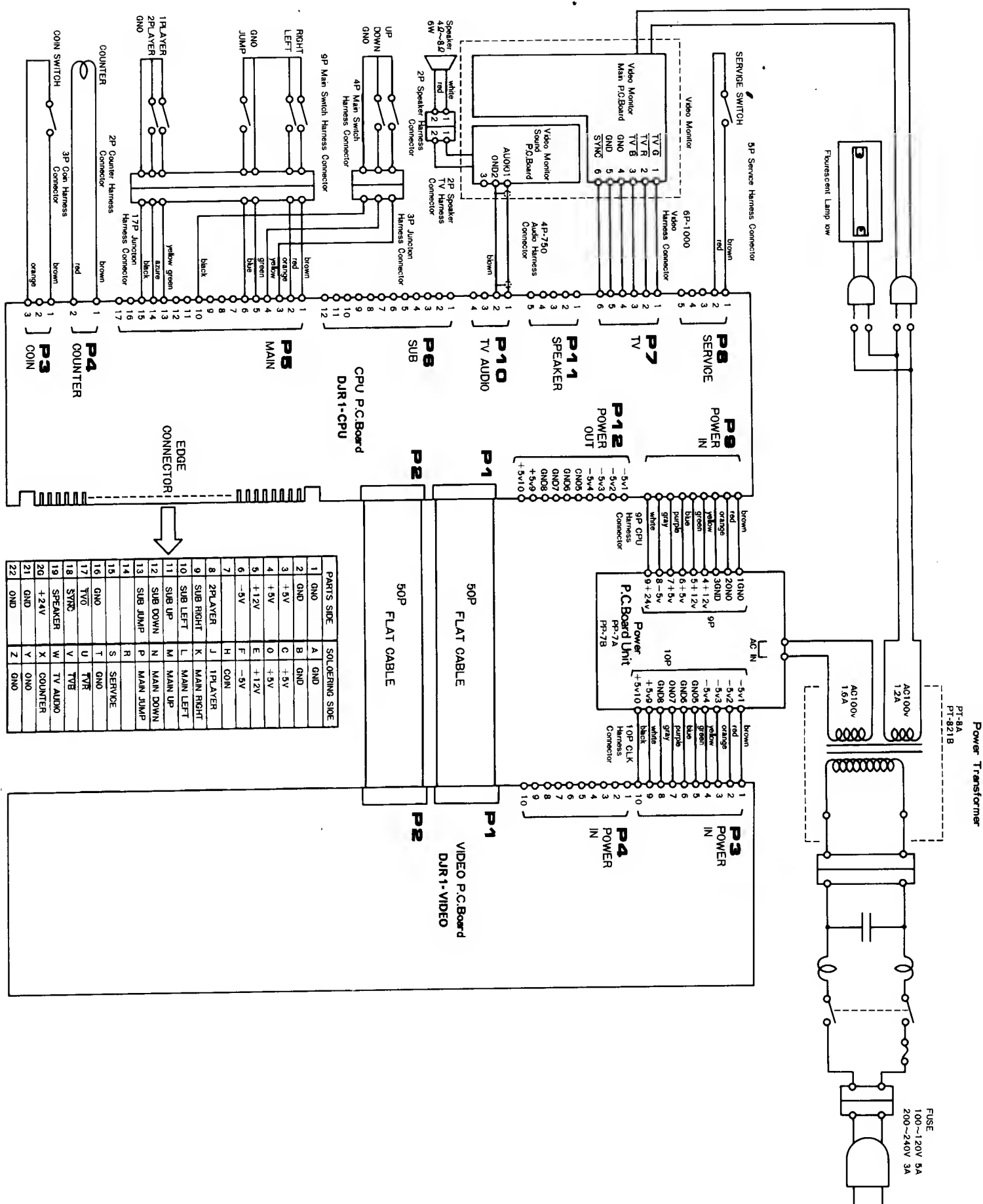
|     |  |   |                                       |
|-----|--|---|---------------------------------------|
| VR1 | 50K $\Omega$ 1/3W top type<br>white knob |  | Turn right to move<br>image downward. |
| VR2 | 50K $\Omega$ 1/3W top type<br>white knob |  | Turn right to move<br>image leftward  |





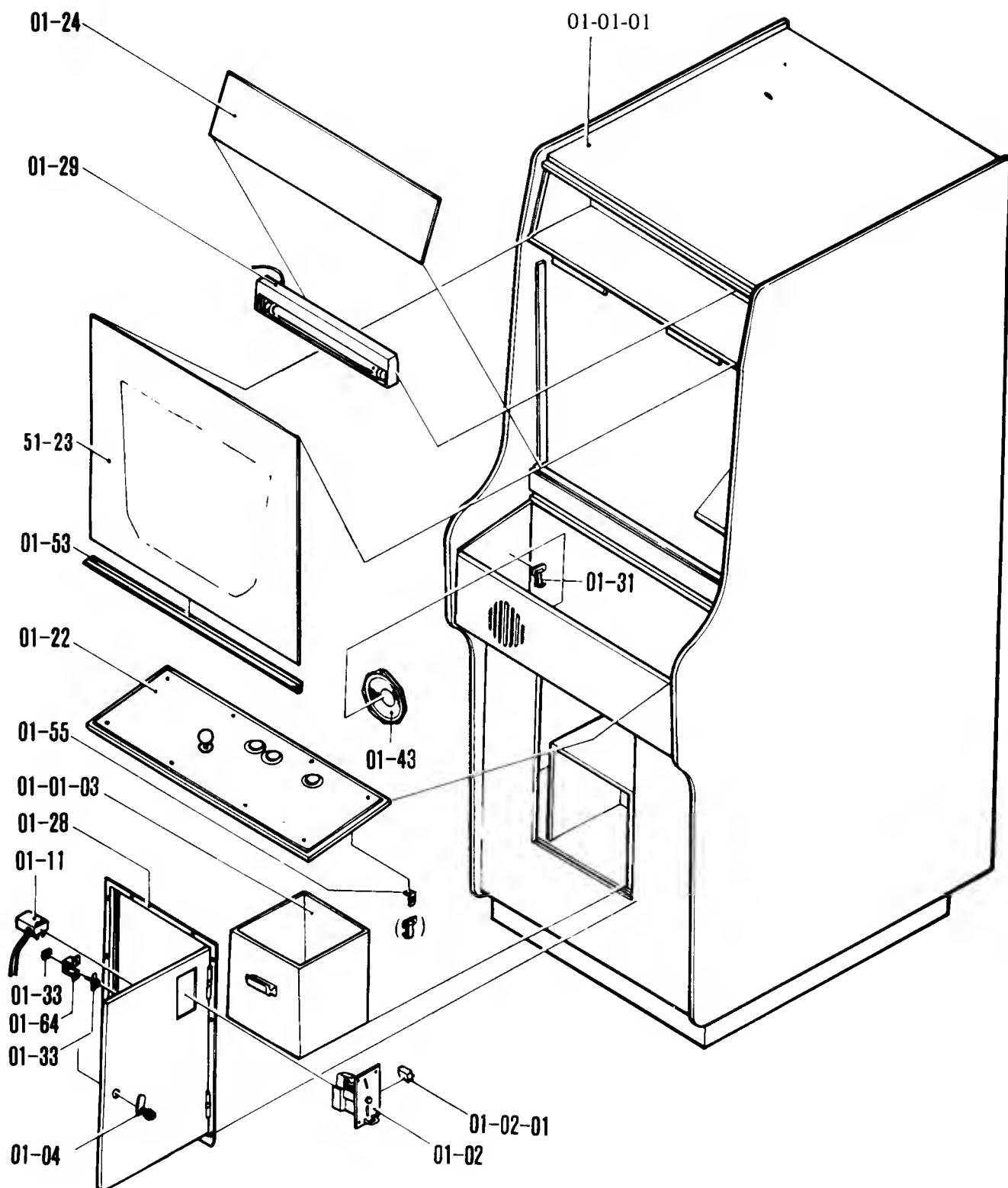
NOTE : Do not touch the inside of the Video Monitor in which many parts are supplied with high tension.

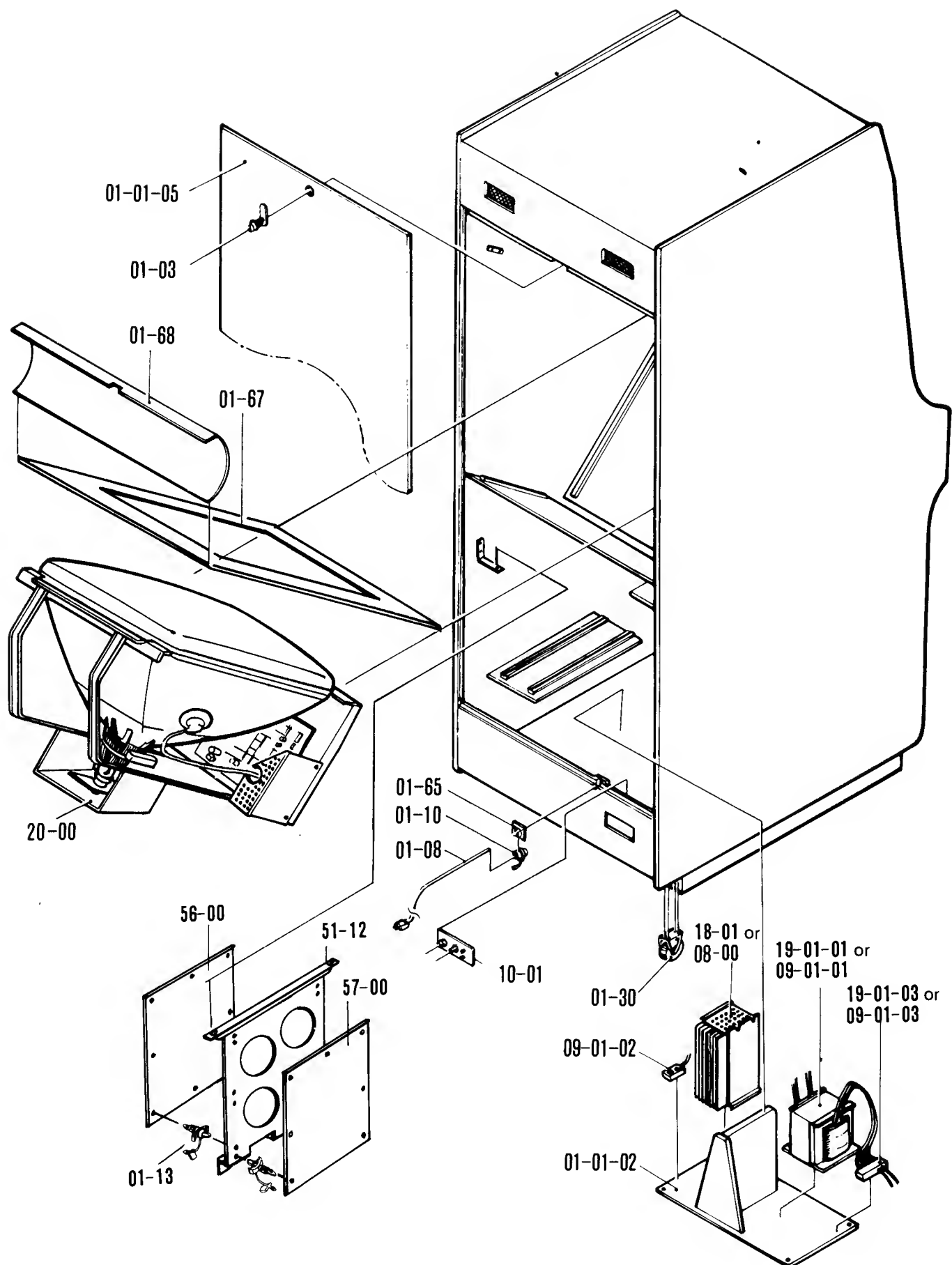
## 6. WIRING AND CONNECTION



## 7. NAME OF EACH PART

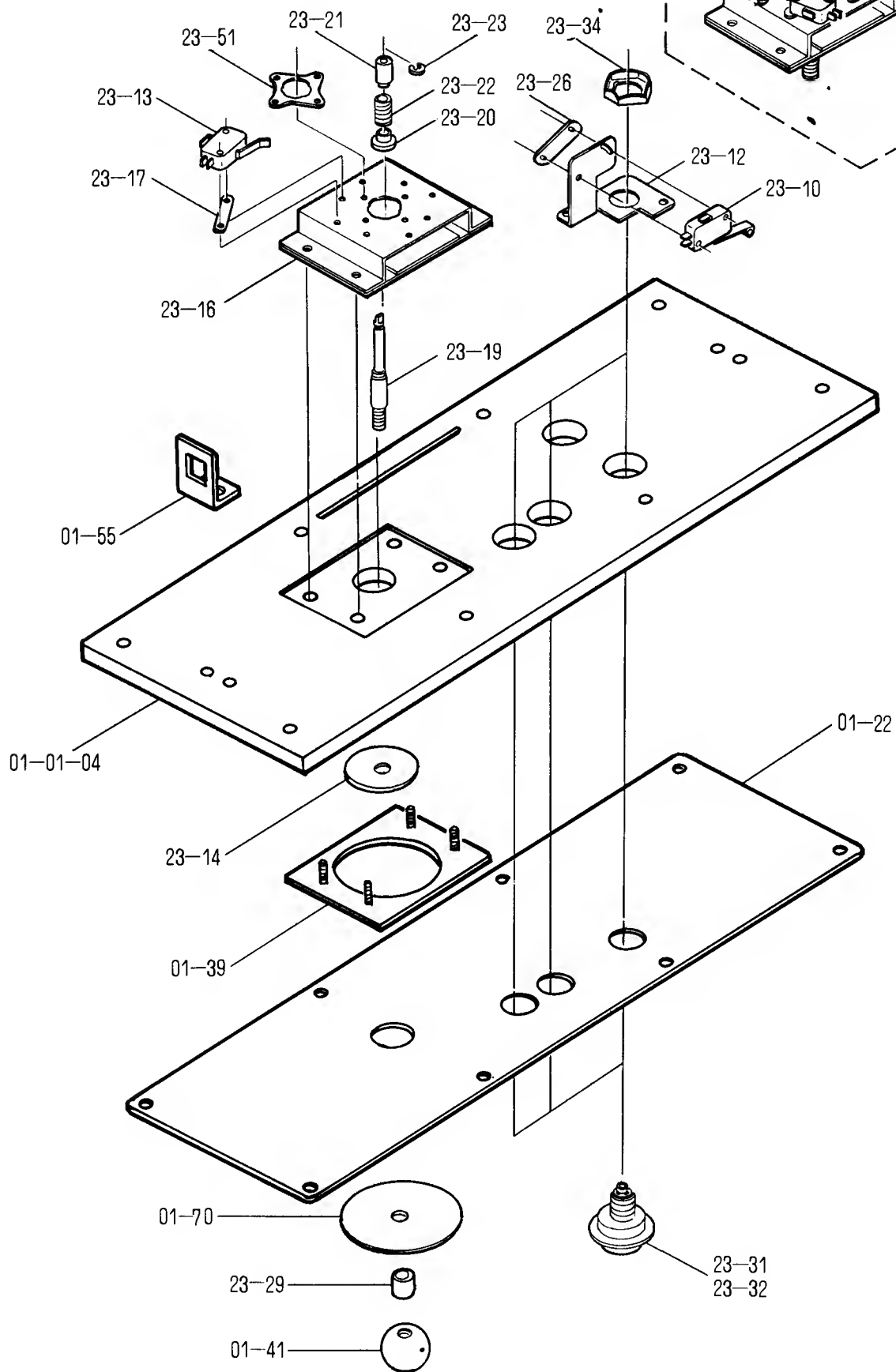
### (1) Body





(2) Operation Panel Assembly

23-50 4 Way Control Lever A'ssy



## 8. PARTS LIST

### 1. DJR-Body

| No.           | Name of Parts                         | Q'ty | Remarks      | FOB Japan<br>per pc. |
|---------------|---------------------------------------|------|--------------|----------------------|
| DJRU-01-01-01 | Body                                  | 1    |              |                      |
| DJRU-01-01-02 | Transformer Base                      | 1    |              |                      |
| DJRU-01-01-03 | Cash Box                              | 1    |              |                      |
| DJRU-01-01-04 | Control Lever Ass'y Base              | 1    |              |                      |
| DJRU-01-01-05 | Back Door                             | 1    |              |                      |
| DJRU-01-02    | Coin Selector                         | 1    | T            |                      |
| DJRU-01-02-01 | Coin Switch                           | 1    | T            |                      |
| DJRU-01-03    | Back Door Lock                        | 1    |              |                      |
| DJRU-01-04    | Front Door Lock                       | 1    |              |                      |
| DJRU-01-08    | Power Cord                            | 1    |              |                      |
| DJRU-01-10    | Strain Relief Bushing                 | 1    | T            |                      |
| DJRU-01-11    | Game Counter                          | 1    | T            |                      |
| DJRU-51-12    | TKG4 P.C.Board Mounting<br>Bracket    | 1    |              |                      |
| DJRU-01-13    | P.C.Board Support                     | 16   |              |                      |
| DJRU-01-22    | Operation Panel                       | 1    |              |                      |
| DJRU-51-23    | Front Screen                          | 1    |              |                      |
| DJRU-01-24    | Name Plate                            | 1    |              |                      |
| DJRU-01-28    | Front Door Ass'y                      | 1    |              |                      |
| DJRU-01-29    | Fluorescent Lamp Ass'y                | 1    |              |                      |
| DJRU-01-30    | Caster                                | 2    |              |                      |
| DJRU-01-31    | Operation Panel Ass'y<br>Fastener (A) | 2    |              |                      |
| DJRU-01-33    | Service Switch                        | 1    | T            |                      |
| DJRU-01-39    | Control Lever Ass'y<br>Mounting Plate | 1    |              |                      |
| DJRU-01-41    | Control Lever Knob                    | 1    |              |                      |
| DJRU-01-43    | Speaker                               | 1    |              |                      |
| DJRU-01-53    | Front Screen Frame (Lower)            | 1    |              |                      |
| DJRU-01-55    | Operation Panel Ass'y<br>Fastener (B) | 2    |              |                      |
| DJRU-01-64    | Service Switch Bracket                | 1    |              |                      |
| DJRU-01-65    | Strain Relief Bushing Plate           | 1    |              |                      |
| DJRU-01-67    | Blind Cardboard (Large)               | 1    |              |                      |
| DJRU-01-68    | Blind Cardboard (Small)               | 1    |              |                      |
| DJRU-01-70    | Control Knob Plate                    | 1    |              |                      |
| DJRU-56-00    | VIDEO P.C.Board                       | 1    | (DJR1-VIDEO) |                      |
| DJRU-57-00    | CPU P.C.Board                         | 1    | (DJR1-CPU)   |                      |
| DJRU-08-00    | (PP-7A) Power P.C.Board               | 1    | T            |                      |
| DJRU-18-01    | (PP-7B) Power P.C.Board               | 1    | T            |                      |

| No.           | Name of Parts                    | Q'ty | Remarks                      | FOB Japan<br>per pc. |
|---------------|----------------------------------|------|------------------------------|----------------------|
| DJRU-09-01-01 | (PT-8A) Power Transformer        | 1    | (Sexipolar)<br>(Quadrupolar) |                      |
| DJRU-19-01-01 | (PT-821B) Power Transformer      | 1    |                              |                      |
| DJRU-09-01-02 | 2P Table Tap                     | 1    |                              |                      |
| DJRU-09-01-03 | Terminal Block                   | 1    |                              |                      |
| DJRU-19-01-03 | Terminal Block                   | 1    |                              |                      |
| DJRU-10-01    | Power Switch Ass'y               | 1    |                              |                      |
| DJRU-13-01    | 10P CLK Harness Connector        | 1    | T                            |                      |
| DJRU-13-02    | 2P Counter Harness Connector     | 1    | T                            |                      |
| DJRU-13-03    | 9P CPU Harness Connector         | 1    |                              |                      |
| DJRU-13-04    | 3P Coin Harness Connector        | 1    |                              |                      |
| DJRU-13-05    | 5P Service Harness Connector     | 1    |                              |                      |
| DJRU-13-06    | 2P Speaker TV Harness Connector  | 1    |                              |                      |
| DJRU-13-07    | 4P-750 Audio Harness Connector   | 1    | T                            |                      |
| DJRU-13-10    | 9P Main Switch Harness Connector | 1    |                              |                      |
| DJRU-13-11    | 17P Junction Harness Connector   | 1    | T                            |                      |
| DJRU-13-12    | 50P Flat Cable                   | 2    |                              |                      |
| DJRU-13-17    | 2P Speaker Harness Connector     | 1    |                              |                      |
| DJRU-13-28    | 3P Junction Harness Connector    | 1    |                              |                      |
| DJRU-13-29    | 4P Main Switch Harness Connector | 1    |                              |                      |
| DJRU-13-31    | 6P-1000 Video Harness Connector  | 1    |                              |                      |
| DJRU-20-00    | Video Monitor                    | 1    | (20-5F)                      |                      |
| DJRU-23-10    | Micro Switch                     | 3    | T                            |                      |
| DJRU-23-12    | Switch Button Bracket            | 3    |                              |                      |
| DJRU-23-13    | Control Switch                   | 4    |                              |                      |
| DJRU-23-14    | Blind Plate                      | 1    |                              |                      |
| DJRU-23-16    | Bearing Bracket                  | 1    |                              |                      |
| DJRU-23-17    | Switch Spacer                    | 4    |                              |                      |
| DJRU-23-19    | Schaft                           | 1    |                              |                      |
| DJRU-23-20    | Spring Stopper                   | 1    |                              |                      |
| DJRU-23-21    | Switch Collar                    | 1    | T                            |                      |
| DJRU-23-22    | Lever Spring                     | 1    | T                            |                      |
| DJRU-23-23    | E Ring 4                         | 1    | T                            |                      |
| DJRU-23-26    | Nut Plate                        | 3    | T                            |                      |
| DJRU-23-29    | Control Knob Collar              | 1    |                              |                      |
| DJRU-23-31    | Switch Button Ass'y (Blue)       | 2    |                              |                      |
| DJRU-23-32    | Switch Button Ass'y (Orange)     | 1    |                              |                      |
| DJRU-23-34    | Pal Nut                          | 3    |                              |                      |
| DJRU-23-50    | 4 Way Control Lever Ass'y        | 1    | T                            |                      |
| DJRU-23-51    | 4 Way Guide Plate                | 1    | T                            |                      |

## 2. VIDEO P.C.Board

| No.       | Name of Parts   | Q'ty | Remarks   | FOB Japan<br>per pc. |
|-----------|-----------------|------|---|----------------------|
| DJR-56-00 | VIDEO P.C.Board | 1    | Complete Set (TKG4-11-VIDEO)                                      |                      |
| DJR-56-01 | IC SN74LS00     | 2    | Quadruple 2-Input Positive NAND Gates                             |                      |
| DJR-56-02 | IC SN 74LS02    | 3    | Quadruple 2-Input Positive Nor Gates                              |                      |
| DJR-56-03 | IC SN74LS04     | 6    | Hex Inverters   |                      |
| DJR-56-04 | IC SN74LS08     | 1    | Quadruple 2-Input AND Gate  |                      |
| DJR-56-05 | IC SN74LS10     | 1    | Tri 3 Input NAND Gate   |                      |
| DJR-56-06 | IC SN74LS20     | 4    | Dual 4-Input Positive NAND Gate                                   |                      |
| DJR-56-07 | IC SN74LS30     | 1    | 8-Input Positive NAND Gate  |                      |
| DJR-56-08 | IC SN74LS32     | 1    | Quadruple 2-Input Positive or Gate                                |                      |
| DJR-56-09 | IC SN74LS74     | 4    | Dual D-Type Edge-Triggered Flip-Flop w/Set and Reset              |                      |
| DJR-56-10 | IC SN74LS86     | 7    | Quadruple 2-Input Exclusive OR Gate                               |                      |
| DJR-56-11 | IC SN74LS109    | 1    | Dual J-K Positive Edge-Triggered Flip-Flops with Preset and Clear |                      |
| DJR-56-12 | IC SN74LS123    | 2    | Dual Retriggerable Single Shot                                    |                      |
| DJR-56-13 | IC SN74LS139    | 1    | Dual 2-to 4-Line Decoder/Demultiplexer                            |                      |
| DJR-56-14 | IC SN74LS157    | 14   | Quadruple 2-Line to 1-Line Data                                   |                      |
| DJR-56-15 | IC SN74LS161    | 4    | Synchronous Presettable 4-Bit Binary Counter w/Direct Reset       |                      |
| DJR-56-16 | IC SN74LS163    | 2    | 4-Bit Binary Counter with Synchronous clear                       |                      |
| DJR-56-17 | IC SN74LS174    | 1    | Hex D-Type Flip-Flop w/Reset RAM                                  |                      |
| DJR-56-18 | IC SN74LS175    | 2    | Quadruple D-Type Flip-Flop w/Reset                                |                      |
| DJR-56-19 | IC-SN74LS245    | 2    | Octal 3-State Bus Transceivers                                    |                      |
| DJR-56-20 | IC SN74LS273    | 4    | Octal D-FFS   |                      |
| DJR-56-21 | IC SN74LS283    | 8    | 4 Bit Binary Full Adder   |                      |
| DJR-56-22 | IC SN74LS299    | 6    | 8 Bit Bidirectional Universal Shift/Storage                       |                      |
| DJR-56-23 | IC SN74LS367    | 2    | Hex Bus Driver w/3 State Output                                   |                      |
| DJR-56-24 | IC SN74LS373    | 2    | Octal 3-State D-Latches   |                      |
| DJR-56-25 | IC SN74LS377    | 1    | Octal D-Type Flip-Flops   |                      |
| DJR-56-26 | IC SN74S161     | 3    | Schotkey 4-Bit Binary Counter with Direct Clear                   |                      |
| DJR-56-27 | IC MB10105      | 1    | Triple 2-3-2-Input OR/NOR Gates                                   |                      |
| DJR-56-28 | IC MB10116      | 1    | Triple Line Receivers   |                      |
| DJR-56-29 | IC MB10124      | 4    | Quadruple TTL-to-ECL Translators                                  |                      |
| DJR-56-30 | IC MB10125      | 3    | Quadruple ECL-to-TTL Translators                                  |                      |
| DJR-56-31 | IC MB10136      | 1    | Universal Hexadecimal Counter                                     |                      |
| DJR-56-32 | IC 2716         | 4    | 2048 x 8 Bit EP-ROM   |                      |
| DJR-56-33 | IC MB7074       | 2    | ECL-RAM (MBM10422) with Radiator Fin                              |                      |



| No.       | Name of Parts            | Q'ty | Remarks                             | FOB Japan<br>per pc. |
|-----------|--------------------------|------|-------------------------------------|----------------------|
| DJR-56-34 | IC 2732                  | 2    | 4096 x 8 Bit EP-ROM                 |                      |
| DJR-56-35 | IC MB93419               | 1    | 64 x 9 Bipolar RAM                  |                      |
| DJR-56-36 | IC MB8114                | 2    | 1024 x 4-Bit Static MOS RAM         |                      |
| DJR-56-37 | IC MB8148L55             | 2    | 1024 x 4-Bit Static RAM .           |                      |
| DJR-56-38 | IC 24S10                 | 1    | 256 x 4-Bit Bipolar P-ROM           |                      |
| DJR-56-39 | Resistor Array           | 4    | RNSA-09P-551J 8-device 510 $\Omega$ |                      |
| DJR-56-40 | Resistor Array           | 1    | RNSA-09P-102J 8-device 1k $\Omega$  |                      |
| DJR-56-41 | Variable Resistor        | 2    | 50k $\Omega$ 1/3W                   |                      |
| DJR-56-42 | Resistor (Carbon)        | 2    | 10k $\Omega$ 1/4W $\pm$ 5%          |                      |
| DJR-56-43 | Resistor (Carbon)        | 12   | 510 $\Omega$ 1/4W $\pm$ 5%          |                      |
| DJR-56-44 | Resistor (Carbon)        | 2    | 15k $\Omega$ 1/4W $\pm$ 5%          |                      |
| DJR-56-45 | Resistor (Carbon)        | 4    | 2.2k $\Omega$ 1/4W $\pm$ 5%         |                      |
| DJR-56-46 | Resistor (Carbon)        | 2    | 4.7k $\Omega$ 1/4W $\pm$ 5%         |                      |
| DJR-56-47 | Resistor (Carbon)        | 1    | 22k $\Omega$ 1/4W $\pm$ 5%          |                      |
| DJR-56-48 | Resistor (Carbon)        | 1    | 27k $\Omega$ 1/4W $\pm$ 5%          |                      |
| DJR-56-49 | Resistor (Carbon)        | 24   | 1k $\Omega$ 1/4W $\pm$ 5%           |                      |
| DJR-56-50 | Electrolytic Capacitor   | 2    | 220 $\mu$ F 16V                     |                      |
| DJR-56-51 | Electrolytic Capacitor   | 2    | 1 $\mu$ F 50V                       |                      |
| DJR-56-52 | Ceramic Capacitor        | 1    | 47pF 50V                            |                      |
| DJR-56-53 | Ceramic Capacitor        | 128  | 0.01 $\mu$ F 50V                    |                      |
| DJR-56-54 | Ceramic Capacitor        | 1    | 33pF 50V                            |                      |
| DJR-56-55 | Ceramic Capacitor        | 2    | 10pF 50V                            |                      |
| DJR-56-56 | Ceramic Capacitor        | 4    | 220pF 50V                           |                      |
| DJR-56-57 | Ceramic Capacitor        | 2    | 68pF 50V                            |                      |
| DJR-56-58 | Ceramic Capacitor        | 1    | 330pF 50V                           |                      |
| DJR-56-60 | Polyester Film Capacitor | 1    | 1000pF 50V (102kz)                  |                      |
| DJR-56-61 | Polyester Film Capacitor | 1    | 0.1 $\mu$ F 50V                     |                      |
| DJR-56-62 | Polyester Film Capacitor | 1    | 0.022 $\mu$ F 50V                   |                      |
| DJR-56-63 | Transistor               | 2    | 2SC1215-R/S/T                       |                      |
| DJR-56-64 | Crystal Oscillator       | 1    | 61.44MHz (HC-18U)                   |                      |

## 3. CPU P.C.Board

| No.       | Name of Parts | Q'ty | Remarks  | FOB Japan<br>per pc. |
|-----------|---------------|------|--|----------------------|
| DJR-57-00 | CPU P.C.Board | 1    | Complete Set (TKG4-11-CPU)                           |                      |
| DJR-57-01 | IC SN74LS00   | 2    | Quadruple 2-Input Positive NAND Gates*               |                      |
| DJR-57-02 | IC SN74LS02   | 2    | Quadruple 2-Input Positive NOR Gate                  |                      |
| DJR-57-03 | IC SN74LS04   | 6    | Hex Inverters  |                      |
| DJR-57-04 | IC SN74LS08   | 1    | Quadruple 2-Input AND Gates                          |                      |
| DJR-57-05 | IC SN74LS32   | 1    | Quadruple 2-Input Positive OR Gate                   |                      |
| DJR-57-06 | IC SN74LS74   | 2    | Dual D-Type Edge-Triggered Flip-Flop w/Set and Reset |                      |
| DJR-57-07 | IC SN74LS86   | 1    | Quadruple 2-Input Exclusive OR Gate                  |                      |
| DJR-57-08 | IC SN74LS123  | 4    | Dual Retriggerable Single Shot                       |                      |
| DJR-57-09 | IC SN74LS125  | 1    | Quadruple 3 State Bus Buffers                        |                      |
| DJR-57-10 | IC SN74LS132  | 1    | Quadruple 2-Input NAND Schmit Triggers               |                      |
| DJR-57-11 | IC SN74LS138  | 5    | 3-to-8-Line Decoder/Demultiplexer                    |                      |
| DJR-57-12 | IC SN74LS139  | 1    | Dual 2-to-4-Line Decoder/Demultiplexer               |                      |
| DJR-57-13 | IC SN74LS157  | 1    | 2-to-1-Line Data Selectors/Multiplexers              |                      |
| DJR-57-14 | IC SN74LS164  | 2    | 8-Bit Serial-In Parallel-Out Shift Register          |                      |
| DJR-57-15 | IC SN74LS174  | 3    | Hex D-Type Flip-Flop                                 |                      |
| DJR-57-17 | IC SN74LS240  | 4    | Octal Buffer/Line Driver/Line Receiver w/3-State     |                      |
| DJR-57-18 | IC SN74LS245  | 1    | Octal 3-State Bus Transceivers                       |                      |
| DJR-57-19 | IC SN74LS259  | 3    | 8-Bit Addressable Latches                            |                      |
| DJR-57-20 | IC SN74LS367  | 6    | Hex Bus Driver w/3 State Output                      |                      |
| DJR-57-21 | IC SN74LS373  | 3    | Octal 3-State D-latches                              |                      |
| DJR-57-22 | IC SN74LS629  | 3    | Voltage Control Oscillators                          |                      |
| DJR-57-23 | IC MB8114     | 6    | 1024 x 4-Bit Static MOS RAM                          |                      |
| DJR-57-24 | IC 2764       | 3    | 8192 x 8-Bit EP ROM                                  |                      |
| DJR-57-25 | IC Z80A       | 1    | 8-Bit Microprocessor                                 |                      |
| DJR-57-26 | IC 24S10      | 2    | Bipolar ROM 256 x 4-Bit                              |                      |
| DJR-57-27 | IC 8257-5     | 1    | DMA Controller                                       |                      |
| DJR-57-28 | IC 2732       | 1    | 4096 x 8-Bit EP ROM                                  |                      |
| DJR-57-29 | IC MB8884     | 1    | 8-Bit Microprocessor                                 |                      |
| DJR-57-30 | IC MB3614     | 1    | Lower Power Quadruple Operational Amplifiers         |                      |
| DJR-57-31 | IC 3192       | 1    | Custom   |                      |
| DJR-57-32 | IC DAC08CQ    | 1    | 8-Bit Digital-to-Analog Converter                    |                      |
| DJR-57-33 | IC CD4020B    | 1    | 14-Stage Binary Ripple Counter                       |                      |

| No.       | Name of Parts                    | Q'ty | Remarks                     | FOB Japan<br>per pc. |
|-----------|----------------------------------|------|-----------------------------|----------------------|
| DJR-57-34 | Transistor                       | 4    | 2SC1815                     |                      |
| DJR-57-35 | Transistor                       | 1    | 2SC1384-R                   |                      |
| DJR-57-36 | Transistor                       | 4    | 2SC828-P/Q                  |                      |
| DJR-57-37 | Transistor                       | 2    | 2SA564-P/Q/R                |                      |
| DJR-57-38 | Diode                            | 10   | IS953                       |                      |
| DJR-57-39 | Diode                            | 1    | W03B                        |                      |
| DJR-57-40 | Dip Switch                       | 1    | B-8A                        |                      |
| DJR-57-41 | Aluminium Electrolytic Capacitor | 2    | 470 $\mu$ F 16V             |                      |
| DJR-57-42 | Electrolytic Capacitor           | 1    | 220 $\mu$ F 16V             |                      |
| DJR-57-43 | Electrolytic Capacitor           | 1    | 33 $\mu$ F 16V              |                      |
| DJR-57-44 | Electrolytic Capacitor           | 3    | 1 $\mu$ F 50V               |                      |
| DJR-57-45 | Electrolytic Capacitor           | 1    | 4.7 $\mu$ F 50V             |                      |
| DJR-57-46 | Electrolytic Capacitor           | 2    | 3.3 $\mu$ F 50V             |                      |
| DJR-57-47 | Electrolytic Capacitor           | 15   | 10 $\mu$ F 16V              |                      |
| DJR-57-48 | Electrolytic Capacitor           | 2    | 100 $\mu$ F 16V             |                      |
| DJR-57-49 | Electrolytic Capacitor           | 3    | 47 $\mu$ F 16V              |                      |
| DJR-57-50 | Ceramic Capacitor                | 3    | 0.068 $\mu$ F 25V           |                      |
| DJR-57-51 | Ceramic Capacitor                | 82   | 0.01 $\mu$ F 50V            |                      |
| DJR-57-52 | Ceramic Capacitor                | 1    | 0.022 $\mu$ F 25V           |                      |
| DJR-57-53 | Ceramic Capacitor                | 2    | 22pF 50V                    |                      |
| DJR-57-54 | Ceramic Capacitor                | 2    | 0.47 $\mu$ F 50V            |                      |
| DJR-57-56 | Polyester Film Capacitor         | 1    | 0.01 $\mu$ F 50V            |                      |
| DJR-57-57 | Polyester Film Capacitor         | 1    | 0.22 $\mu$ F 50V            |                      |
| DJR-57-58 | Polyester Film Capacitor         | 1    | 0.022 $\mu$ F 50V           |                      |
| DJR-57-59 | Polyester Film Capacitor         | 1    | 0.0047 $\mu$ F 50V          |                      |
| DJR-57-60 | Polyester Film Capacitor         | 2    | 0.12 $\mu$ F 50V            |                      |
| DJR-57-61 | Polyester Film Capacitor         | 1    | 0.056 $\mu$ F 50V           |                      |
| DJR-57-62 | Tantalum Capacitor               | 3    | 10 $\mu$ F 16V              |                      |
| DJR-57-63 | Tantalum Capacitor               | 1    | 4.7 $\mu$ F 16V             |                      |
| DJR-57-64 | Tantalum Capacitor               | 2    | 22 $\mu$ F 16V              |                      |
| DJR-57-65 | Series Resistor Array            | 3    | 1k $\Omega$ PNSA-09P-102J   |                      |
| DJR-57-66 | Parallel Resistor Array          | 6    | 68 $\Omega$ PNSB-08P-680J   |                      |
| DJR-57-67 | Series Resistor Array            | 1    | 4.7k $\Omega$ PNSB-09P-472J |                      |
| DJR-57-68 | Resistor (Carbon)                | 6    | 47k $\Omega$ 1/4W $\pm$ 5%  |                      |
| DJR-57-69 | Resistor (Carbon)                | 1    | 2k $\Omega$ 1/4W $\pm$ 5%   |                      |
| DJR-57-70 | Resistor (Carbon)                | 6    | 4.7k $\Omega$ 1/4W $\pm$ 5% |                      |
| DJR-57-71 | Resistor (Carbon)                | 9    | 10k $\Omega$ 1/4W $\pm$ 5%  |                      |
| DJR-57-72 | Resistor (Carbon)                | 7    | 100k $\Omega$ 1/4W $\pm$ 5% |                      |
| DJR-57-73 | Resistor (Carbon)                | 15   | 1k $\Omega$ 1/4W $\pm$ 5%   |                      |
| DJR-57-74 | Resistor (Carbon)                | 2    | 5.6k $\Omega$ 1/4W $\pm$ 5% |                      |

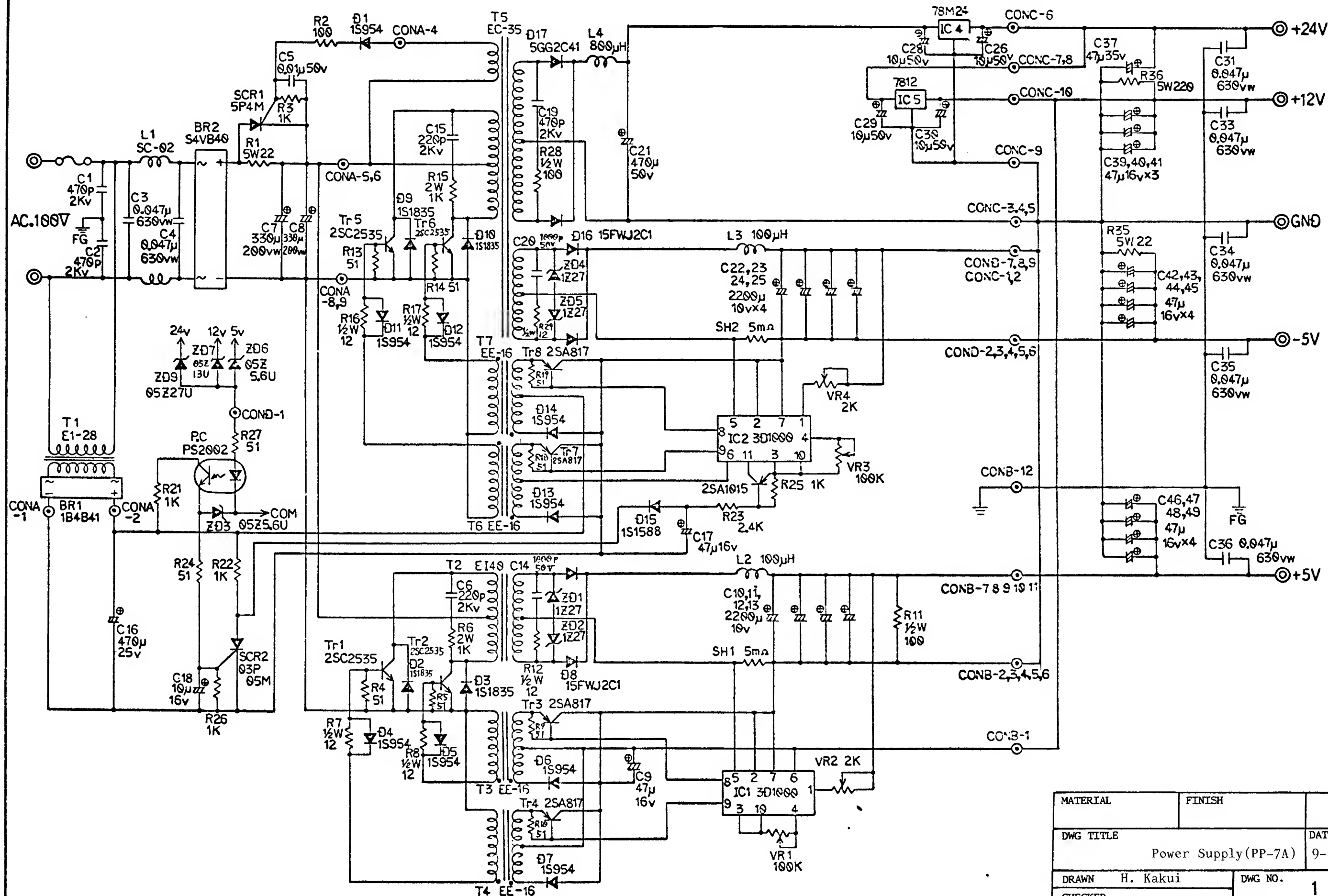
| No.       | Name of Parts      | Q'ty | Remarks               | FOB Japan<br>per pc. |
|-----------|--------------------|------|-----------------------|----------------------|
| DJR-57-75 | Resistor (Carbon)  | 1    | 120Ω 1/4W ±5%         |                      |
| DJR-57-76 | Resistor (Carbon)  | 1    | 150Ω 1/4W ±5%         |                      |
| DJR-57-77 | Resistor (Carbon)  | 2    | 20KΩ 1/4W ±5%         |                      |
| DJR-57-78 | Resistor (Carbon)  | 1    | 150KΩ 1/4W ±5%        |                      |
| DJR-57-79 | Resistor (Carbon)  | 1    | 30KΩ 1/4W ±5%         |                      |
| DJR-57-80 | Resistor (Carbon)  | 1    | 43KΩ 1/4W ±5%         |                      |
| DJR-57-81 | Resistor (Carbon)  | 1    | 13KΩ 1/4W ±5%         |                      |
| DJR-57-83 | Resistor (Carbon)  | 5    | 68Ω 1/4W ±5%          |                      |
| DJR-57-84 | Resistor (Carbon)  | 7    | 330Ω 1/4W ±5%         |                      |
| DJR-57-85 | Resistor (Carbon)  | 2    | 33kΩ 1/4W ±5%         |                      |
| DJR-57-86 | Resistor (Carbon)  | 4    | 220Ω 1/4W ±5%         |                      |
| DJR-57-87 | Resistor (Carbon)  | 5    | 470Ω 1/4W ±5%         |                      |
| DJR-57-88 | Resistor (Carbon)  | 1    | 680Ω 1/4W ±5%         |                      |
| DJR-57-89 | Resistor (Carbon)  | 4    | 100Ω 1/4W ±5%         |                      |
| DJR-57-90 | Resistor (Carbon)  | 1    | 200Ω 1/4W ±5%         |                      |
| DJR-57-91 | Crystal Oscillator | 1    | HC-18U-182 (6.000MHz) |                      |

## 4. Power P.C.Board

| No.       | Name of Parts                     | Q'ty | Remarks                        | FOB Japan<br>per pc. |
|-----------|-----------------------------------|------|--------------------------------|----------------------|
| DJR-18-01 | (PP-7B) Power P.C.Board           | 1    | Complete Set                   |                      |
| DJR-18-02 | Transistor                        | 1    | 2SC2555                        |                      |
| DJR-18-03 | Transistor                        | 2    | 2SA817                         |                      |
| DJR-18-04 | Transistor                        | 1    | 2SC2535                        |                      |
| DJR-18-05 | Transistor                        | 1    | 2SA1015                        |                      |
| DJR-18-06 | Fast Recovery Center<br>Tap Diode | 1    | CTU-2S                         |                      |
| DJR-18-07 | Shot Key Diode                    | 2    | CTB33S                         |                      |
| DJR-18-08 | Silicon Rectifier Diode           | 1    | S4VB40 4A 400VW                |                      |
| DJR-18-09 | Silicon Rectifier Diode           | 1    | 1B4B4I                         |                      |
| DJR-18-10 | Hybrid IC                         | 2    | 3D-1001                        |                      |
| DJR-18-11 | 3 Terminals Regulators            | 1    | 7824                           |                      |
| DJR-18-12 | 3 Terminals Regulators            | 1    | 7812                           |                      |
| DJR-18-13 | Thyristors                        | 1    | 5P4M                           |                      |
| DJR-18-14 | Thyristors                        | 1    | 03P05M                         |                      |
| DJR-18-15 | Diode                             | 4    | 1S954                          |                      |
| DJR-18-16 | Diode                             | 4    | 10DF-4                         |                      |
| DJR-18-17 | Photo Coupler                     | 1    | PC614                          |                      |
| DJR-18-18 | Zener Diode                       | 1    | 05Z5.6U                        |                      |
| DJR-18-19 | Zener Diode                       | 1    | 05Z5.1L                        |                      |
| DJR-18-20 | Zener Diode                       | 1    | 05Z5.6Z                        |                      |
| DJR-18-21 | Ceramic Capacitor                 | 3    | DE0707B471K2K 470pF2KV         |                      |
| DJR-18-22 | Ceramic Capacitor                 | 1    | 0.1MF 50V                      |                      |
| DJR-18-23 | Film Capacitor                    | 3    | MDD2J473M 0.047MF 630VW        |                      |
| DJR-18-24 | Film Capacitor                    | 2    | 0.01MF 50V                     |                      |
| DJR-18-25 | Film Capacitor                    | 2    | 1000pF 50V                     |                      |
| DJR-18-26 | Aluminum Electrolytic Capacitor   | 1    | 1000MF 50V                     |                      |
| DJR-18-27 | Aluminum Electrolytic Capacitor   | 2    | 47MF 35V                       |                      |
| DJR-18-28 | Aluminum Electrolytic Capacitor   | 7    | 47MF 16V                       |                      |
| DJR-18-29 | Aluminum Electrolytic Capacitor   | 4    | 3300MF 10V                     |                      |
| DJR-18-30 | Aluminum Electrolytic Capacitor   | 2    | 100MF 25V                      |                      |
| DJR-18-31 | Aluminum Electrolytic Capacitor   | 5    | 10MF 16V                       |                      |
| DJR-18-32 | Aluminum Electrolytic Capacitor   | 2    | 330MF 200V                     |                      |
| DJR-18-33 | Aluminum Electrolytic Capacitor   | 1    | 1000MF 25V                     |                      |
| DJR-18-34 | Resistor (Coil Winding)           | 1    | 20 OHM 2W                      |                      |
| DJR-18-35 | Resistor (Carbon)                 | 5    | 1K OHM $\frac{1}{4}W \pm 5\%$  |                      |
| DJR-18-36 | Resistor (Carbon)                 | 8    | 51 OHM $\frac{1}{4}W \pm 5\%$  |                      |
| DJR-18-37 | Resistor (Carbon)                 | 6    | 12 OHM $\frac{1}{2}W \pm 5\%$  |                      |
| DJR-18-38 | Resistor (Carbon)                 | 1    | 470 OHM $\frac{1}{4}W \pm 5\%$ |                      |
| DJR-18-39 | Resistor (Carbon)                 | 1    | 22 OHM $\frac{1}{2}W \pm 5\%$  |                      |
| DJR-18-40 | Resistor (Carbon)                 | 2    | 20K OHM $\frac{1}{2}W \pm 5\%$ |                      |

| No.       | Name of Parts          | Q'ty | Remarks              | FOB Japan<br>per pc. |
|-----------|------------------------|------|----------------------|----------------------|
| DJR-18-41 | Resistor (Carbon)      | 1    | 100 OHM ½W           |                      |
| DJR-18-42 | Resistor (Cement)      | 1    | 20 OHM 5W            |                      |
| DJR-18-43 | Resistor (Metal Oxide) | 1    | 510 OHM 3W           |                      |
| DJR-18-44 | Variable Resistor      | 2    | 50K OHM GF06P        |                      |
| DJR-18-45 | Variable Resistor      | 2    | 2K OHM GF06P         |                      |
| DJR-18-46 | Shunt Resistor         | 2    | 5m OHM               |                      |
| DJR-18-47 | SC Coil                | 1    | SC-02                |                      |
| DJR-18-48 | SF Coil                | 2    | 100MH 5A             |                      |
| DJR-18-49 | SF Coil                | 2    | 800MH 2A             |                      |
| DJR-18-50 | Oscillator Transformer | 1    | EC-35 Type 3D-0097   |                      |
| DJR-18-51 | Oscillator Transformer | 1    | EI-30 Type 3D-0097   |                      |
| DJR-18-52 | Oscillator Transformer | 2    | EE-16 Type 3D-1000   |                      |
| DJR-18-53 | Fuse Element           | 1    | FGMB 4A 125V NR Type |                      |





|                |                      |              |
|----------------|----------------------|--------------|
| MATERIAL       | FINISH               |              |
| DWG TITLE      | Power Supply (PP-7A) | DATE 9-25-81 |
| DRAWN H. Kakui | DWG NO. 1            |              |
| CHECKED        |                      |              |
| Nintendo       |                      | SCALE SIZE   |





# 20-EZV(R-B)

## NOTE

1. Every resistors without value descriptions are 1/4W
2. Bearable voltage of capacitors are 50V
3. Diodes without descriptions of variation are 1S1555 or 1S2706 or 1S2473 or DS442

## Resistors

Ex. : 2 F P J Rank of Accuracy(\*List 1)  
 Figure  
 Variations(\*List 2)  
 Value(W)

## List 1.

| Mark | F   | G   | J   | K    |
|------|-----|-----|-----|------|
| Rank | +1% | +2% | +5% | +10% |

## List 2.

| Mark      | F      | N     | R           | C     | Y            |
|-----------|--------|-------|-------------|-------|--------------|
| Variation | Carbon | Metal | Metal Oxide | Solid | Coil Winding |

## List 3.

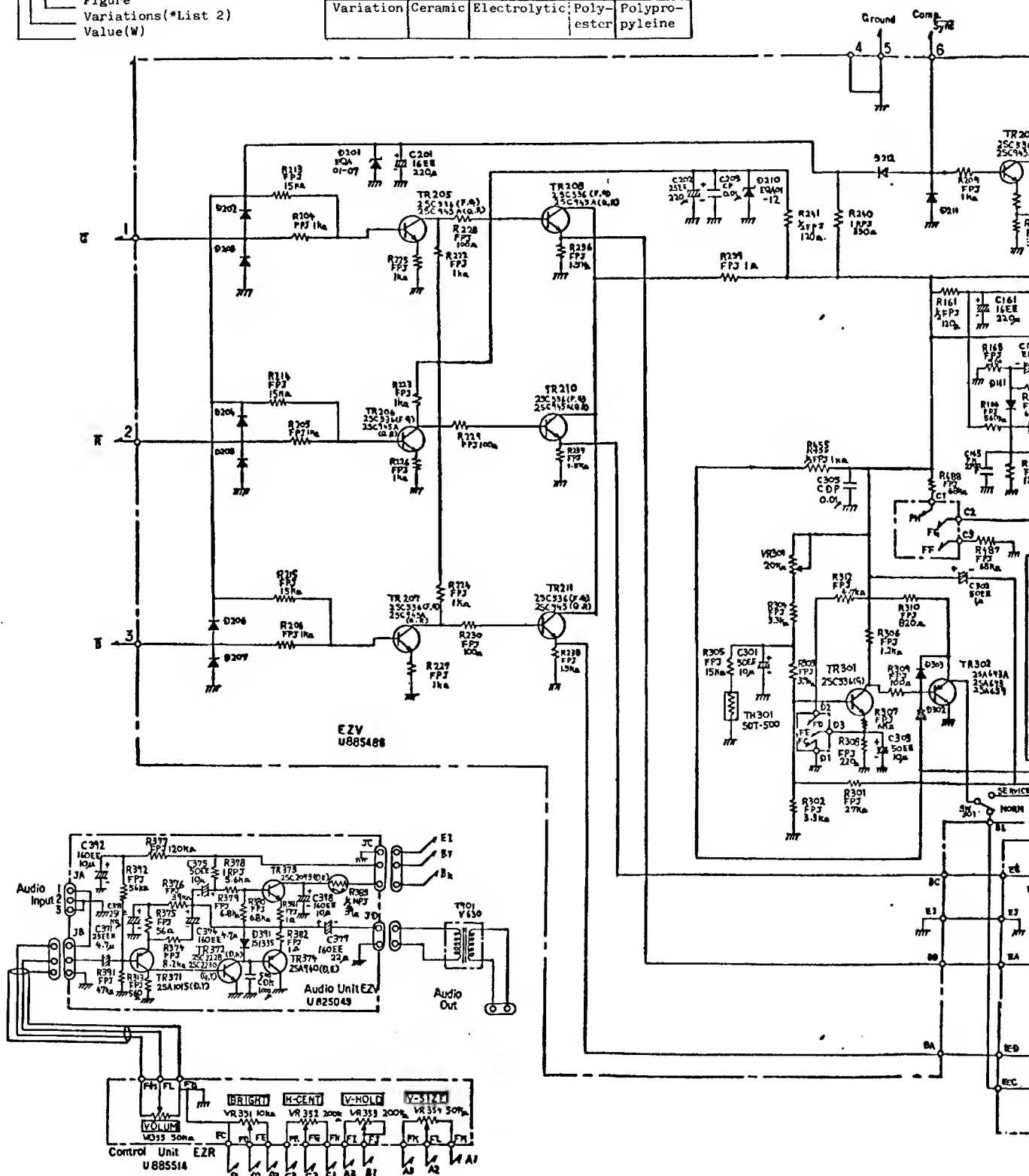
| Mark      | C       | EE           | F          | N             |
|-----------|---------|--------------|------------|---------------|
| Variation | Ceramic | Electrolytic | Poly-ester | Polypropylene |

## Capacitor

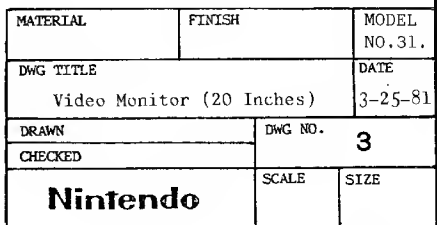
Ex. : 160 EE M- Rank of Accuracy  
 Variation(\*List 2)  
 Bearable Voltage

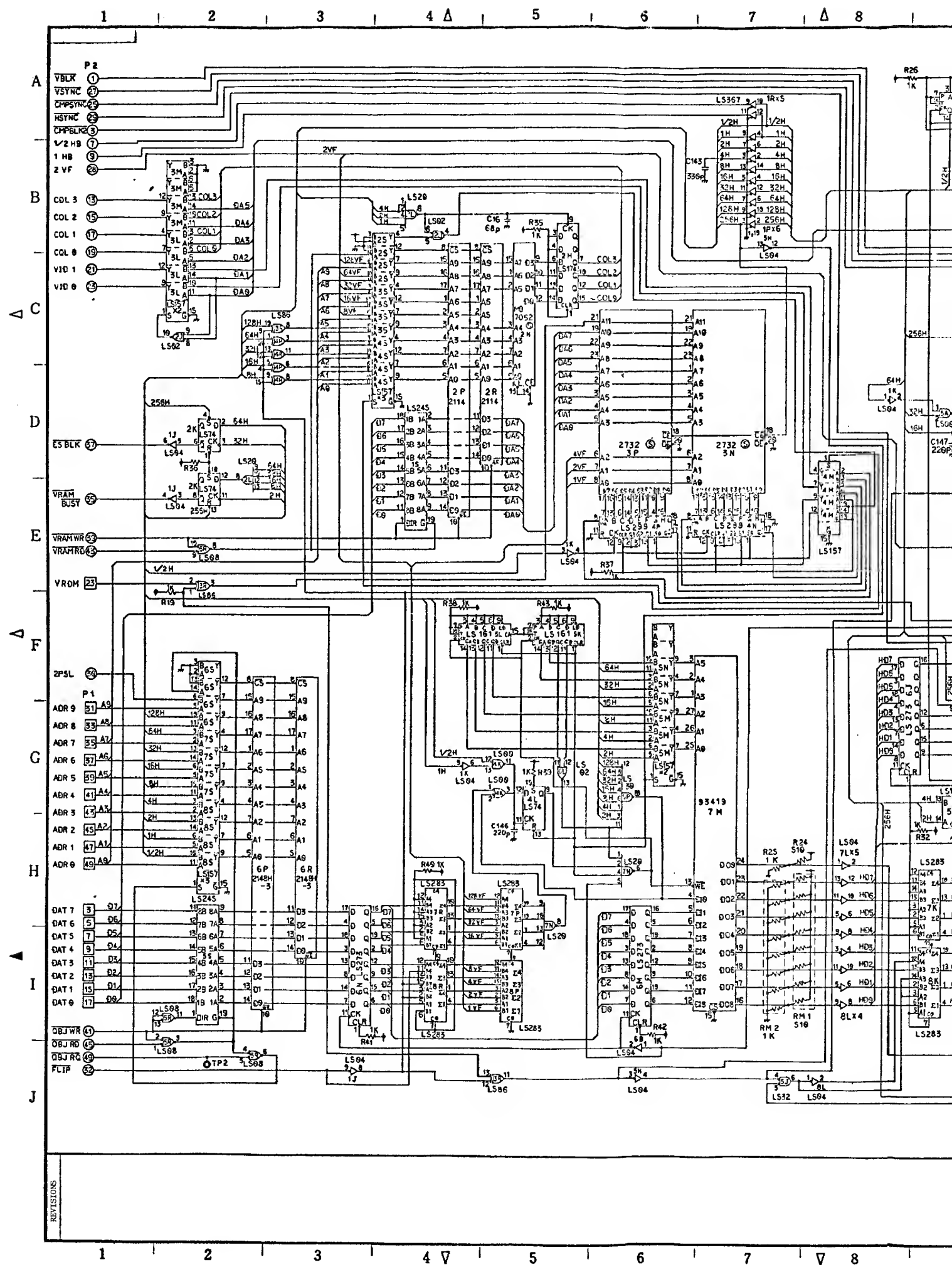
## List 4.

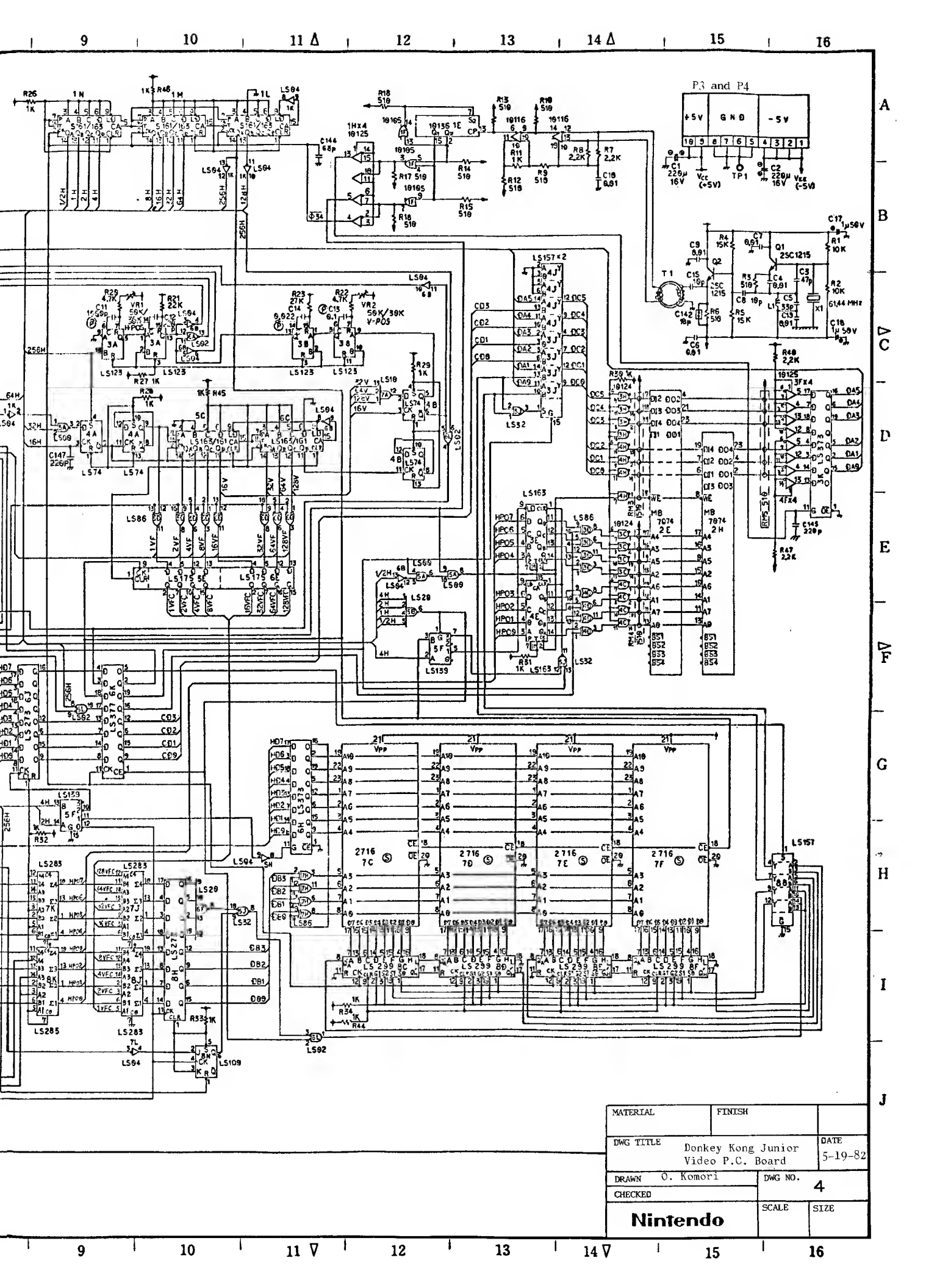
| Mark | J   | K    | M    | N    |
|------|-----|------|------|------|
| Rank | +5% | +10% | +20% | +30% |



|      |      |
|------|------|
| M    | N    |
| +20% | +30% |

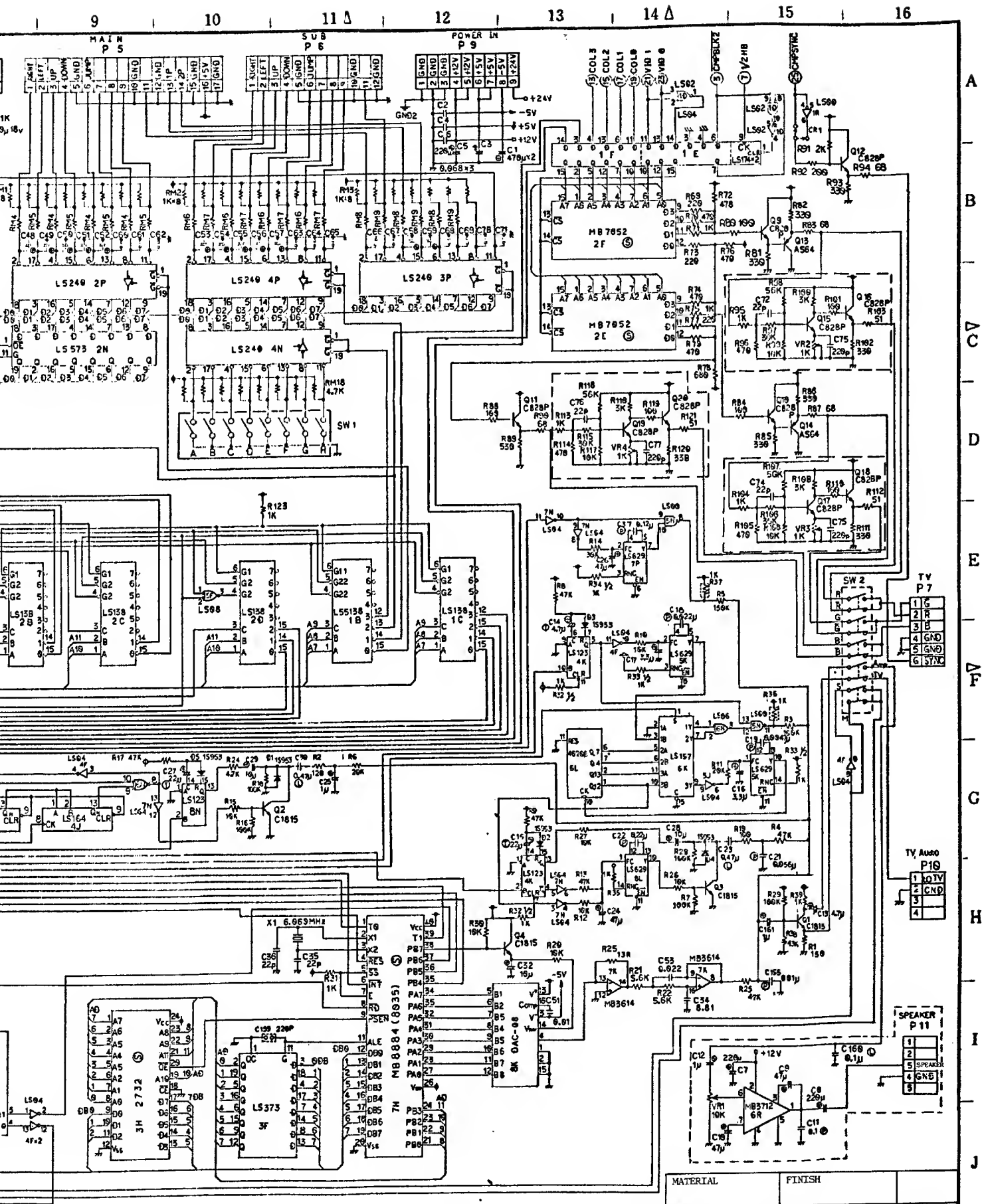






|           |  |  |  |
|-----------|--|--|--|
| MATERIAL  |  | FINISH                                 |  |
| DWG TITLE |  | Donkey Kong Junior<br>Video P.C. Board |  |
| DRAWN     |  | O. Komori                              |  |
| CHECKED   |  | DWG NO. 4                              |  |
| Nintendo  |  | SCALE SIZE                             |  |





## IN ARRANGEMENT

NOTE : 2

NOTE:2  
Parts surrounded with  
dotted line are optional.

**NOTE: 3**

NOTE:3  
SWITCH 2:Each Switch has Cut-land  
and Short-land set with  
parallel.

|  |  |           |                                      |                  |
|--|--|-----------|--------------------------------------|------------------|
| MATERIAL   |  | FINISH    |                                      |                  |
| DWG TITLE  |  |           | Donkey Kong Junior<br>CPU P.C. Board | DATE<br>5-31-82  |
| DRAWN  |  | O. Komori |                                      | DWG NO.<br><br>5 |
| CHECKED  |  |           |                                      |                  |
| <div style="text-align: center; font-size: 2em; font-weight: bold;">Nintendo</div> |  |           | SCALE                                | SIZE             |